Issued by:

Cereal Disease Laboratory

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For the latest cereal rust news from the field, subscribe to the cereal-rust-survey listserv list. To subscribe, please visit: http://www.ars.usda.gov/Main/docs.htm?docid=9970

Or, send an email to: Mark.Hughes@ars.usda.gov

Reports from this list as well as all Cereal Rust Bulletins are maintained on the CDL website (http://www.ars.usda.gov/mwa/cdl)

- Wheat leaf rust levels are low in plots and fields in the southern U.S.
- Wheat stripe rust levels are moderate in plots and fields in Texas, Louisiana and western Washington.
- Barley leaf rust levels were severe on barley volunteer plants in a central Texas nursery.
- Oat crown rust levels are low in the southern U.S.

Wheat Stem Rust. No wheat stem rust has yet been reported in the U.S. this year.

Wheat Leaf Rust. *Texas* – In early February, low levels of leaf rust were found in southern Texas. By late March low to moderate levels of leaf rust were found throughout the state of Texas. The most severe leaf rust was found in the Jagger (Lr17 resistance), Jagalene (Lr24) and TAM 112 (Lr41) cultivars. (For more detailed information see: Texas reports on the <u>Current Cereal Rust Situation Reports page</u>). The above normal rainfall this winter throughout much of Texas has enhanced rust development.

Oklahoma – In mid-February, leaf rust was at trace to low levels in northern Oklahoma plots. On March 24, foliar diseases were minimal on wheat examined in the state of Oklahoma. (For more detailed information see: Oklahoma reports on the <u>Current Cereal Rust Situation Reports page</u>).

Kansas – In early March, low levels of wheat leaf rust that overwintered were found in research plots near Manhattan in northeast Kansas. By late March leaf rust was increasing slowly in Kansas.

Georgia – In late March, no leaf rust was found in southern Georgia wheat fields or plots. In the last two weeks weather conditions in Georgia have been conducive for rust development.

Wheat cultivar *Lr* gene postulation database. *Please visit*: <u>Leaf rust resistance gene postulation in current U.S.</u> wheat cultivars.

Wheat Stripe Rust. *Texas* – In late February, wheat stripe rust levels were severe and extensive throughout the College Station nursery. By late March, low to moderate levels of stripe rust were found throughout the state. Some of the more severe levels of rust were observed on cultivars like Jagger, Jagalene and other cultivars with their parentage. In the past, the *Yr17* stripe rust resistance has been very effective, but the latest reports indicate that new races with virulence to this gene may be present (For more detailed information see: *Yr17* reports on the <u>Current Cereal Rust Situation page</u>). These are the highest stripe rust levels reported in Texas since 2005. The warm weather in late March in southern Texas has slowed stripe rust development.

Oklahoma – In late March, no stripe rust had yet been found in the state of Oklahoma.



Louisiana –In early March, stripe rust foci were found in several wheat plots at Baton Rouge. In mid-March stripe rust was widespread but not severe throughout the state. The cool wet conditions in mid-March were conducive for stripe rust development (For more detailed information see: Louisiana reports on the Current Cereal Rust Situation Reports page).

Arkansas – The first report of stripe rust this year in Arkansas was in the southwest corner of the state near Texarkana in late March.

California – Stripe was reported in nurseries in California in late March.

Pacific Northwest – In mid-March severe levels of wheat stripe were found on susceptible checks in experimental fields in the Mount Vernon area of northwestern Washington. (For more detailed information see: U.S. stripe rust report on the <u>Current Cereal Rust Situation Reports page</u>).

Please send wheat and barley stripe rust collections (5 or more rusted green leaves) as soon as possible after collection to:

Dr. Xianming Chen USDA-ARS 361 Johnson Hall P.O. Box 646430 Washington State University Pullman, WA 99164-6430 email: xianming@wsu.edu

Note: Stripe rust collections are vulnerable to heat and do not survive long at warm temperatures; therefore, if shipment of collections for race identification is delayed their viability will be greatly reduced. An overnight courier service is preferred for sending stripe rust collections.

Oat Stem Rust. No oat stem rust has yet been reported in the U.S.

Oat Crown Rust. In late March, traces of crown rust were found on oat in central and southern Texas. Crown rust infections are lighter than normal in the southern U.S.

Barley Leaf Rust. In early March, severe levels of barley leaf rust were found on volunteer barley plants at the College Station, Texas experiment station.

Barley Stem and Stripe Rust. No barley stem or stripe rust has yet been reported in the U.S. this year.

Rye or Stem Leaf Rust. No rye leaf or stem rust has been reported in the U.S.



Please Note: Current cereal rust situation reports

Cereal Rust Bulletins are distributed every two weeks on average during the season; for the most timely cereal rust situation reports, subscribe to the cereal rust survey listserv list*. Instructions can be found at:

http://www.lsoft.com/scripts/wl.exe?SL1=CEREAL-RUST-SURVEY&H=LISTS.UMN.EDU

Or, if you prefer, simply send a message to Mark Hughes (<u>Mark.Hughes@ars.usda.gov</u>) and he will add you to the list. Messages from the list are maintained on the CDL website (http://www.ars.usda.gov/Main/docs.htm?docid=9757).

If you have information on the cereal rust situation (or other small grain diseases) in your area that you would like to share, please email your observations to:

Mark Hughes (Mark. Hughes@ars.usda.gov) and David Long (David.Long@ars.usda.gov)

Or to: CEREAL-RUST-SURVEY@LISTS.UMN.EDU

Or, if you prefer: call Dave (612-625-1284)

We would like to include your name and email address so others can contact you. If, however, you prefer not having your name or email address appear with the information, please let us know when submitting your observations.

Information of most importance

We welcome any information you can provide, but are particularly interested in:

- Location (state, county, etc.)
- Rust (leaf rust, stem rust, stripe rust)
- Host (wheat, oat, etc.)
- Cultivar or line name if known
- Severity and prevalence
- Growth stage -when rust likely arrived, when infection first noted and current stage
- Where rust is found on the plants, e.g., lower leaves, flag leaf, etc.

Rust collections

Reports on the distribution of races of cereal rust fungi are an important part of our surveys. We regularly collect and test isolates of stem rust (wheat, oat, and barley), wheat leaf rust, and oat crown rust. We appreciate receiving collections of these rusts from cooperators around the U.S. If you can provide samples, please contact David Long (mailto:David.Long@ars.usda.gov) or Mark Hughes (mailto:Mark.Hughes@ars.usda.gov) and they will send you a packet of collection envelopes and forms.

Cooperators page

For more information, which may be of interest, please visit our Cooperator's page.

* The sole purpose of the Cereal Rust Survey listserv list is to provide a format for cereal researchers, extension personnel and others to share observations of cereal rusts and other cereal diseases. We make no warranty about any information shared on this listserv or its utility or applicability. Mention of any product, brand, or trademark does not imply endorsement or recommendation of that product, brand, or trademark by USDA-ARS, or any of the participants on this listserv. By enrolling on this listserv list, participants understand and agree to abide by these conditions.

